



CITY OF CAMBRIDGE

EXECUTIVE DEPARTMENT

Robert W. Healy, City Manager

Richard C. Rossi, Deputy City Manager

March 22, 2010

To the Honorable, the City Council:

RECOMMENDATIONS

That the City Council approve the following block rates for water consumption and sewer use for the period beginning April 1, 2010 and ending March 31, 2011. The City administration and City Council continue to recognize that it is important to mitigate the effects of water and sewer increases both for FY11 and future fiscal years as much as possible. Therefore, I am submitting a recommendation that calls for a 1.5% increase in the water rate and a 7.9% increase in the sewer rate, resulting in a 5.8% increase in the combined rate.

It is important to note that water consumption, along with the budget, are the major factors in determining the rate necessary to generate sufficient water and sewer revenues. With regard to the water rate, the use of fund balance is an important factor in determining the water rate. Sewer charges are directly linked with water consumption, with sewer costs comprising approximately 2/3 of total water and sewer expenditures. Therefore, when consumption declines, revenues are negatively impacted. In the current fiscal year, water is being consumed at approximately the same level as in the previous fiscal year. In FY09, there was a 4% decrease in water use from the previous fiscal year. However, FY10 is the first year in the last four where the city has not seen a decrease in consumption.

While the total FY11 Water Budget reflects a budget decrease of 5.1% from FY10 Projected and the total Sewer Budget reflects a 3.9% increase from FY10 Projected, which includes a 2.8% increase in the MWRA assessment, the impact of level water consumption, and therefore level revenues, is driving the combined rate increase of 5.8%.

In my recommendation to you last year, the projected FY11 rate increases for water, sewer and combined were 3.7%, 10.0% and 8.0%, respectively, based on consumption rates in March 2009. We have, however, been able to produce rate increases lower than estimates from last year. Overall, the city has been successful over the past five years in producing reasonable water and sewer rate increases. The average annual increases for the FY06-10 period were as follows: Water, 1.7%; Sewer, 5.7%; and Combined, 4.3%, which include the water rate showing 0% increases in both FY06 and FY08 and a sewer rate increase of 0% in FY08.

FY11 estimated sewer revenues will cover the FY11 estimated Massachusetts Water Resources Authority (MWRA) assessment, which is scheduled to increase by \$597,951 to \$21,617,301, or 2.8%. The MWRA rate increase projected for the City is subject to change based on the MWRA budget adopted later in the Spring 2010. Estimated sewer revenues will also cover operating and capital increases.

In February 2010, the City issued \$6,925,000 in bonds to finance several sewer reconstruction projects throughout the city. The annual debt service costs attributable to these bonds are included in the sewer budget.

FY11 estimated water revenues will cover salary and benefit increases for Water Department employees while costs related to the operation of the water plant have decreased. Debt service costs continue to decline, by \$1.646.510 this year, due to the pay-off of a portion of the bonds for the water treatment plant and additional debt service savings generated by the refinancing of existing debt in 2007. The projected fund balance for FY10 is \$5.603,782, of which \$250,000 will be used in FY11 to offset a higher rate increase.

The chart below reflects the FY10 actual and FY11 proposed water and sewer rates.

| | Annual Consumption* | FY10 Water Rate | FY11 Proposed Water Rate | FY10 Sewer Rate | FY11 Proposed Sewer Rate |
|---------|---------------------|-----------------------|--------------------------------|-----------------------|--------------------------------|
| Block 1 | 0 – 40 CcF | \$2.98 | \$3.02 | \$7.28 | \$7.86 |
| Block 2 | 41 – 400 CcF | \$3.19 | \$3.24 | \$7.71 | \$8.32 |
| Block 3 | 401 – 2.000 CcF | \$3.39 | \$3.44 | \$8.28 | \$8.93 |
| Block 4 | 2,001 – 10,000 CcF | \$3.60 | \$3.65 | \$8.92 | \$9.62 |
| Block 5 | Over 10.000 CcF | \$3.90 | \$3.96 | \$9.48 | \$10.23 |

^{*}All rates are per CcF. CcF is an abbreviation of 100 cubic feet. One CcF is approximately 750 gallons.

BACKGROUND

In March of each year, the City Council establishes water and sewer rates, which determine water and sewer revenues for the next fiscal year. Because of the timing requirements, water and sewer rates are set prior to the adoption of both the Cambridge budget and MWRA budget; therefore, revenue needs are based upon estimated expenditures. Historically, water and sewer rates have been established so that revenues generated by them, when combined with other revenue sources, cover projected annual costs.

While the projected FY11 rate increase of 1.5% for water is lower than the five year average, the 7.9% for sewer and 5.8% for combined are above the average annual increases for the past five years (Water, 1.7%; Sewer, 5.7%; and Combined, 4.3%) but are still moderate increases and reflect increases lower than were estimated last year. It should be noted that the water rate increases of 0% in FY06 and FY08 and the sewer rate increase of 0% in FY08, are rare occurrences and demonstrate our commitment keep rates low.

WATER

Beginning 11 fiscal years ago (2000), a portion of the fund balance from the Water Fund has been used to offset increases in the operation of the Water Department. In FY11, the fund balance support will be \$250,000, which is a decrease of \$1,000,000 from the FY10 amount. This is a significant decrease in the use of fund balances from prior fiscal years. For example, the estimated use of fund balance for FY10 was \$1,250,000. By using \$250,000 from the fund balance in FY11, the City is able to achieve a 1.5% water rate increase while providing capital funds for infrastructure improvements. It is expected that use of the fund balance will be eliminated in FY12, which coincides with a significant decrease in the water debt service. As Table 3 on page 6 indicates, the total FY11 water operating and capital budget decreased by 5.1% from \$19,857.525 in FY10 to \$18,853,630. As noted above, the decrease in debt service has offset increases in the operating budget.

The Capital allocation has increased \$250,000 from its FY10 level of \$1,500,000. Table 3 on page 6 indicates the details of Water Fund projected revenues and expenditures for the years 2010 to 2015. Table 6 on page 9 shows actual Water Fund balances for FY05-09 and the projected balance for FY10.

SEWER

Sewer operating and capital budgets have increased from the FY10 adjusted budget levels by 3.9%, due to a projected 2.8% increase in the Massachusetts Water Resources Authority (MWRA) assessment, salary and benefit increases, debt service and capital budget increases. Overall, the sewer rate is projected to increase by 7.9%, which is below the 10.0% projected for FY11 in last year's letter.

The increase in the MWRA assessment is due primarily to higher interest costs on MWRA debt, which comprises approximately 58% of the MWRA budget.

As mentioned above, this sewer increase is lower than the rate projected for FY11 in last year's letter. It should be noted that the MWRA assessment and debt service on sewer bonds account for 90.3% of the total Sewer budget. The Sewer operating budget is above its FY10 level, while the capital allocation has increased by \$200.000 to \$800.000.

However, unlike the Water budget, sewer revenues are credited to the General Fund and not to a separate Proprietary Fund that can be drawn upon if the need arises.

CAPITAL PROJECTS

The debt service increase is primarily attributable to the following sewer projects that were included in the February 2010 bond issue: Agassiz; Cherry Street / S. Mass. Avenue: Cambridgeport: Western Avenue: and Fresh Pond projects. Since May 1998, the City Council has authorized \$266,636,730 for water and sewer capital projects in the Capital Budget process. This impressive investment in our water and sewer systems represents significant progress towards ensuring that Cambridge will continue to benefit throughout this century from a healthy and environmentally sound water and sewer system. In addition to the projects currently under way, the five-year capital plan calls for an additional investment of approximately \$147,462,968 (primarily sewer, \$133.712,968) in the water and sewer systems.

The allocation of \$1,750,000 for water will be used mainly for improvements to the distribution and transmission system including water main replacement on main streets in conjunction with sewer reconstruction projects planned by Public Works. equipment replacement, improvements to security control systems, engineering and program development, and improvements to the watershed.

Sewer improvements are projected to continue in the following areas: Cherry Street / South Massachusetts Avenue: Agassiz Neighborhood: Fresh Pond; Cambridgeport: Harvard Square; and Western Avenue. The City carefully monitors the issuance of debt to fund authorized sewer projects and makes adjustments to ensure that debt service cost increases, which impact the sewer rate, are moderate.

During the past decade, the State has made substantial contributions to the City's water and sewer capital improvement program through the State Revolving Loan Program. In FY10, state subsidies covered \$2,001,560, or 9.4% of the total debt service of \$21,313.838. It is anticipated that the City will continue to receive State subsidies on existing debt. The FY11-15 capital plan includes several projects that may be eligible for subsidized loans from the State. However, since it is not certain that these projects will receive state subsidies, the debt service on these projects has been calculated based on funding through General Obligation bonds. In order to proceed with the projects while restricting the growth of the sewer

rate, the original five-year plan for sewer projects has been extended, since the total debt service on the loans will be covered through the sewer service charge. If state subsidies become available to the City, they will be used to lower the sewer rate in future years. Table 4 on page 7 shows the detail of sewer-related expenditures for FY10-15.

Table 1 below summarizes the change in water and sewer metered revenue, while Table 2 presents the estimated average charge to residential water/sewer bills.

FY11 projected revenues are based on FY10 projected collections and reflect our practice of conservative revenue projections.

TABLE 1
Combined Water / Sewer Metered Revenue

| | FY10 Revised | FY11 Projected - | % Change |
|--------------------------------|--------------|------------------|----------|
| Water | \$17,300,000 | \$17.562,505 | 1.5% |
| Sewer | \$35,000,000 | \$37,769,712 | 7.9% |
| Combined Water / Sewer Revenue | \$52.300,000 | \$55,332.217 | 5.8% |

TABLE 2
Average Change to Combined Water and Sewer Residential Bills

| Residential Type | FY10 | FY11 Projected | Annual Variance | % Change |
|------------------|---------|----------------|-----------------|----------|
| Single Family | \$722 | \$764 | \$42 | 5.8% |
| Two Family | \$956 | \$1.011 | \$55 | 5.8% |
| Three Family | \$1,444 | \$1,528 | \$84 | 5.8% |

SENIOR DISCOUNT PROGRAM

There are currently 2,840 homeowners who qualify for the age 65+ water / sewer 15% discount (not to exceed \$90 annually), which is not tied to the homeowner's income.

There are also 107 elderly homeowners who qualify for an income-based discount of 30% (not to exceed \$180 annually). To qualify for the 30% discount, a homeowner must be 65 or older and must have been granted the Clause 41C elderly real estate exemption. For FY10, the income guidelines are as follows: single, income of \$23,061 with assets of \$46,122 or less; married, income of \$34,592 with assets of \$63,418 or less.

FUTURE OUTLOOK FOR RATES

Tables 3, 4, 5 and 6 contain five-year forecasts for water, sewer and combined revenue estimates as well as Water Fund Balances for the past five years and the projected FY10 fund balance. As can be seen in Table 5, the annual combined water / sewer rate is projected to increase by an average of approximately 5.9% for FY11-15. The projected increase is the result of the City's infrastructure improvement program and increases in the MWRA assessment (based on estimates received from the MWRA) of 2.8-10.3% in FY11-15. If increases in the MWRA assessment are more moderate and subsidies for new State Revolving Fund loans are funded, the rate increases that are shown will be lowered. Conversely, if consumption increases and therefore revenues increase, rate increases will be

affected positively. However, if consumption were again to decrease, there will be a negative effect on water and sewer revenues.

Because of our planning process, which includes conservatively estimating our water and sewer revenues and controlling expenditure growth, including debt issuance, we have been able to mitigate a portion of the rate increase that would otherwise have occurred, even with a level consumption rate. This has allowed us to generate a small increase in the water rate and a moderate increase in the sewer rate while still investing in our utility infrastructure.

I believe we have structured our water and sewer program to produce reasonable rate increases in the future to meet the City administration and City Council goal to mitigate the effects of water and sewer increases on residents as much as possible.

Very truly yours,

Robert W. Healy City Manager

RWH/mec Attachments

Table 3
Water Projections
FY10-15

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| . 19,85 | | | 18,977,829 | 19,037,329 | 19,063,703 |
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| | ncreases 4% for FY12-1 | | | | |
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Table 4
Sewer Projections
FY10-15

| Sewer Expenditures | FY10 | FY10 | FY11 | FY12 | FY13 | FY14 | FY15 |
|--|------------------------------------|------------------------------------|--|---|---|---------------------------------|---------------------------------|
| | Budget (Recap) | Projected . | Projected | Projected | Projected | Projected | Projected |
| Public Works | 2,652,490 | 2,448,930 | 2,732,945 | 2.842,263 | 2,955,953 | 3,074,191 | 3,197,159 |
| Capital | 600,000 | 600,000 | 800,000 | 1.750,000 | 500,000 | 1,000,000 | 2,000,000 |
| Existing Debt | 13,520,740 | 13,520,740 | 13,931,452 | 10,183,503 | 8,778,600 | 6,847,242 | 5,701,128 |
| New Debt | - ' | - | - | 2,671,025 | 6,687,363 | 10,858,963 | 13,411,175 |
| Finance | 225,000 | 225,000 | 225,000 | 225,000 | 225,000 | 225,000 | 225,000 |
| Community Development | 44,500 | 44,500 | 44,500 | 44,500 | 44,500 | 44,500 | 44,500 |
| MWRA | 21,333,055 | 21,019,350 | 21,617,301 | 22,546,845 | 23,245,797 | 25,640,114 | 27,152,881 |
| Total | 38,375,785 | 37,858.520 | 39,351,198 | 40,263,136 | 42,437,213 | 47,690,010 | 51,731,843 |
| | Debt Service schedule. | | | d \$2,000,000 in FY1 | | • | |
| 5) All others remain constant. | Debt Service schedule. | | | 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 | | | |
| 5) All others remain constant. Financing Plan | | | | - · · · · · · · · · · · · · · · · · · · | | 47.060.581 | 51.113.776 |
| 5) All others remain constant. Financing Plan Sewer Service Charge | 36,703,880 | 35,000,000 | 37,769,712 | 39,619,105 | 41.800,374 | 47,060,581 559,000 | 51,113.776 550.000 |
| 5) All others remain constant. Financing Plan Sewer Service Charge Non- Metered Sewer Revenues | 36,703,880 550,000 | 35.000.000 800.000 | 37,769,712 550,000 | 39,619, 105 550, 000 | 41,800,374 550,000 | 550,000 | 550,000 |
| 5) All others remain constant. Financing Plan Sewer Service Charge | 36,703,880 | 35,000,000 | 37,769,712 | 39,619,105 | 41.800,374 | | 550,000 68,067 |
| 5) All others remain constant. Financing Plan Sewer Service Charge Non- Metered Sewer Revenues MWPAT Subsidy (existing) Total | 36,703,880 550,000 1,121,905 | 35,000,000 800,000 1,121,905 | 37,769,712 550,000 1,031,486 | 39,619,105 550,000 94,031 | 41,800,374 550,000 86,839 | 550,000 79,429 | 550,000 68,067 51,731,843 |
| 5) All others remain constant. Financing Plan Sewer Service Charge Non- Metered Sewer Revenues MWPAT Subsidy (existing) Total | 36,703,880 550,000 1,121,905 | 35,000,000 800,000 1,121,905 | 37,769,712 550,000 1,031,486 39,351,198 | 39,619,105 550,000 94,031 40,263,136 | 41,800,374 550,000 86,839 42,437,213 | 550,000 79,429 47.690,010 | 550,000 68,067 51,731,843 |
| 5) All others remain constant. Financing Plan Sewer Service Charge Non- Metered Sewer Revenues MWPAT Subsidy (existing) | 36,703,880 550,000 1,121,905 | 35,000,000 800,000 1,121,905 | 37,769,712 550,000 1,031,486 39,351,198 | 39,619,105 550,000 94,031 40,263,136 | 41,800,374 550,000 86,839 42,437,213 | 550,000 79,429 47.690,010 | 550,000 |

Table 5 Combined Water and Sewer Projections FY10-15

| | FY10 | FY10 | FY11 | FY12 | FY13 | FY14 | FY15 |
|-----------------------|----------------|------------|------------|-------------------|------------|------------|------------|
| | Budget / Recap | Projected | Budget | Projected | Projected | Projected | Projected |
| Metered Water Revenue | 17,456,165 | 17,300,000 | 17,562,505 | 18,047,792 | 18,377,829 | 18,437,329 | 18,463,703 |
| Metered Sewer Revenue | 36,703,880 | 35,000,000 | 37,769,712 | 39,619,105 | 41,800,374 | 47,060,581 | 51,113,776 |
| Total | 54,160,045 | 52,300,000 | 55,332,217 | <u>57,666,897</u> | 60,178,203 | 65,497,910 | 69,577,479 |
| % Increase | | <u>-</u> | 5.8% | 4.2% | 4.4% | 8.8% | 6.2% |

Table 6
Water Fund Balances

| | | - | - | |
|---|----|----|----|---|
| н | V١ | ns | _1 | n |

| | As of 6/30/05 | As of 6/30/06 | As of 6/30/07 | As of 6/30/08 | As of 6/30/09 | As of 6/30/10 |
|--------------------|---------------|---------------|---------------|---------------------------------------|---------------|---------------|
| | (Actual) | (Actual) | (Actual) | (Actual) | (Actual) | (Projected) |
| | | | | · · · · · · · · · · · · · · · · · · · | | |
| Water Fund Balance | 5,151,605 | 5,405,061 | 6,715,319 | 7,536,978 | 6,381,652 | 5,603,782 |